CLAIMS

1. A multimedia data recording apparatus comprising:

a recording section that continuously records multimedia data in memory; and

a data amount reduction section that, when vacant capacity of said memory is at or below a threshold value, takes older data or less important data among data recorded in said memory as its object, and reduces a data amount of these data.

2. The multimedia data recording apparatus according to claim 1, wherein said recording section records said multimedia data classified into a plurality of hierarchical layers according to data contents or data precision.

3. The multimedia data recording apparatus according to claim 2, wherein said multimedia data is recorded classified into a plurality of hierarchical layers according to frame rate, required image quality or resolution, image variation amount between frames, required storage time, MPEG (Moving Picture Experts Group) data picture type, importance of a recorded event, or an enhancement layer of data coded by an MPEG scalable coding method.

4. The multimedia data recording apparatus according to claim 2, wherein, when vacant capacity of said memory is at or below a threshold value, said data amount reduction section performs deletion in order starting with data recorded in a lower layer of said hierarchical layers.

5. The multimedia data recording apparatus according to claim 4, wherein said data amount reduction section performs deletion in order starting with older data among data recorded in a lower layer.

6. The multimedia data recording apparatus according to claim 5, wherein said data amount reduction section does not delete data that has not passed a minimum storage time among data recorded in a lower layer.

7. The multimedia data recording apparatus according to claim 1, wherein:

said recording section records said multimedia data classified in a hierarchical structure composed of a plurality of segments set according to a time of acquisition of this data, and a plurality of layers that belong to each segment and are set according to data contents or data precision; and

said data amount reduction section selects a segment whose said time of acquisition is older, and performs deletion in order starting with data recorded in a lower

layer within this segment.

8. A monitoring system equipped with the multimedia data recording apparatus according to claim 4, said monitoring system further comprising a detection section that detects event occurrence in a monitored area;

wherein said data amount reduction section excludes at least one or a plurality of layers in which data related to said event is recorded from data amount reduction as a protected layer.

9. A monitoring system comprising:

the multimedia data recording apparatus according to claim 4;

a measuring section that measures frequency of access to data recorded in said memory; and

a change section that changes at least one or a plurality of layers in which data whose frequency of access is greater than or equal to a predetermined value among data recorded in said memory to a protected layer that is not subject to data amount reduction by said data amount reduction section.

10. A monitoring system comprising:

the multimedia data recording apparatus according to claim 4; and

a determination section that determines mutual

similarity of data recorded in said memory;

wherein said data amount reduction section performs deletion in order starting with data recorded in a lower layer for a layer in which older data is recorded among data determined to have a high degree of similarity by said determination section.

11. A multimedia data recording method comprising:

a recording step of continuously recording multimedia data in memory; and

a data amount reducing step of, when vacant capacity of said memory is at or below a threshold value, taking older data or less important data among data recorded in said memory as its object, and reducing a data amount of these data.